Allergies

Lesson Objective

Identify signs, symptoms and emergency care of allergic reactions to allergen stimuli

Overview

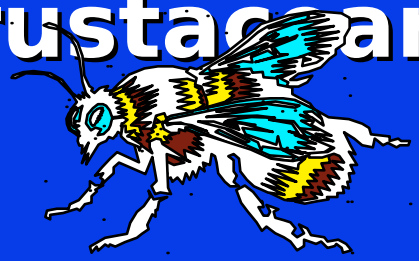
- Allergic Reactions
- Relationship to Airway Management
- Medications

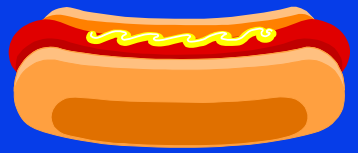
Allergic Reactions

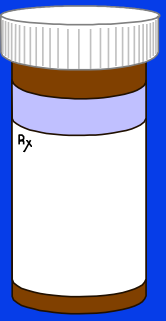
An exaggerated immune response to any substance

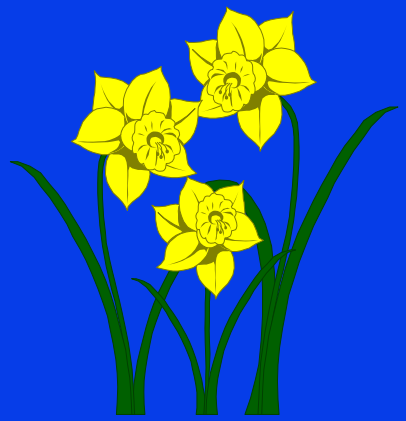
Substances that cause allergic reactions

- Insect bites/stings - bees, wasps
- Food - nuts, crustaceans, peanuts
- Plants
- Medications
- Others









Assessment Findings

- Skin
  - Warm tingling feeling in the face, mouth, chest, feet and hands
  - Itching
  - Hives

Assessment Findings

- Red skin (flushing)
- Swelling to face, neck, hands, feet and/or tongue

Assessment Findings

- Respiratory System
  - Tightness in throat / chest
  - Cough
  - Rapid breathing
  - Labored breathing

Assessment Findings

- Noisy breathing
- Hoarseness (losing voice)
- Stridor
- Wheezing (audible without stethoscope)

Assessment Findings

- Cardiac
  - Increased heart rate
  - Decreased blood pressure

Assessment Findings

- Generalized findings
  - Itchy, watery eyes
  - Headache
  - Sense of impending doom
  - Runny nose
- Decreasing mental status

- Assessment findings that reveal shock or respiratory distress indicate the presence of a severe allergic reaction

Emergency Care

- If patient c/o respiratory distress or exhibits s/s shock
  - Perform initial assessment

Emergency Care

- Perform focused history and physical exam
  - History of allergies
  - What was patient exposed to
  - How were they exposed

Emergency Care

- What effects
- Progression
- Interventions

Emergency Care

- Assess baseline vitals and SAMPLE history
- Administer oxygen if not done in initial assessment

Emergency Care

- Determine if patient has a prescribed preloaded epinephrine available
- Assist with administration of epinephrine

Emergency Care

- Contact medical direction (MCC)
- Record and reassess in 2 min
- Record reassessment findings

Emergency Care

- If patient does not have epinephrine auto-injector available
  - TRANSPORT IMMEDIATELY

Emergency Care

- If patient DOES NOT c/o respiratory distress or exhibit s/s of shock
  - Continue with focused assessment
  - DO NOT give Epinephrine

Airway Management

- Patients may initially present with airway/respiratory compromise
- Airway/respiratory compromise may develop as the allergic reaction progresses

Airway Management

- Manage the airway according to principles identified in the Airway Management lesson

Medications

- Epinephrine auto-injector
  - Medication name
    - Generic - Epinephrine
    - Trade - Adrenaline

Medications

- **Indications**
  - **Tx for patient exhibiting s/s of and allergic reaction**
  - **Prescribed for <u>this</u> patient by a physician**
  - **MCC authorizes use for this patient**

Medications

- Contraindications

- NONE when used in a life-threatening situation

Medications

- Medication form

- Liquid administered via an automatically injectable needle and syringe system

Medications

- Dosage
  - Adult - one adult auto-injector (0.3 mg)
  - Infant and child - one infant/child auto-injector (0.15 mg)

Medications

- Administration
  - Order from MCC
  - Obtain patients prescribed auto-injector
    - Is it the correct patient
    - Medication is not discolored

Medications

- Remove safety cap
- Place tip against patient's thigh
  - Lateral portion of thigh
  - Midway between the waist and the knee

Medications

- Push against thigh until injector activates
- Hold until medication is injected
- Record activity and time
- Dispose of injector in biohazard container

Medications

- Actions
  - Dilates the bronchioles
  - Constricts the blood vessels

Medications

- Side effects
  - Increased heart rate
  - Pallor
  - Dizziness
  - Chest pain
  - Headache

Medications

- Side effects cont.
  - Nausea
  - Vomiting
  - Excitability, anxiousness

Medications

- Re-assessment strategies
  - Transport
  - Continue focused assessment of ABC’s

Medications

- If patient's condition worsens
  - Decreased mental status
  - Increased breathing difficulty
  - Decreased blood pressure
  - Obtain medical direction

Medications

- Give an additional dose of epinephrine
- Treat for shock
- Prepare to initial Basic Cardiac Life support measures
  - CPR
  - AED

Medications

- If patient's condition improves give supportive care
  - Give oxygen
  - Treat for shock

SUMMARY

- Allergic reactions
- Airway management
- Medications